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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/652,258	08/29/2003	Alexander Vaschillo	MS303849.1/MSFTP449US	1975
27195 7590 05/30/2007 AMIN. TUROCY & CALVIN, LLP 24TH FLOOR, NATIONAL CITY CENTER 1900 EAST NINTH STREET CLEVELAND, OH 44114			EXAMINER WOO, ISAAC M	
			ART UNIT 2166	PAPER NUMBER
			MAIL DATE 05/30/2007	DELIVERY MODE PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

<b>Office Action Summary</b>	<b>Application No.</b> 10/652,258	<b>Applicant(s)</b> VASCHILLO ET AL.	
	<b>Examiner</b> Isaac M. Woo	<b>Art Unit</b> 2166	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

#### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) ☒ Responsive to communication(s) filed on 20 April 2007.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) ☒ Claim(s) 1-46 is/are pending in the application.
- 4a) Of the above claim(s) 34-46 is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-33 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

#### Attachment(s)

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)                                | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                       | 5) <input type="checkbox"/> Notice of Informal Patent Application                       |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

### **DETAILED ACTION**

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on April 20, 2007 has been entered.

2. Claims 1, 7, 18-19, 24, 31 and 33 are amended. Claims 34-46 are withdrawn. Claims 1-33 are presented for examination for this office action.

### ***Claim Rejections - 35 USC § 102***

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

4. Claims 1-33 are rejected under 35 U.S.C. 102(e) as being anticipated by Shanmugasundaram et al (U.S. Patent No. 2004/0044959, hereinafter, "Shanmugasundaram").

With respect to claims 1 and 24, Shanmugasundaram teaches a declarative description component that generates facilitates generation of data in an implementation-neutral, declarative format based upon an eXtensible Markup Language (XML) syntax (page 2, sections 0021-0027), that represents the relational database (page 1, sections 0008-0009, page 3, section 0031), generates a file, and stores the data in the file (page 2, sections 0023-0028), the file facilitates reconstruction of the relational database when disconnected from the relational database (fig. 1, page 1, sections 0008-0009, page 3, sections 0023-0038).

With respect to claim 2, Shanmugasundaram teaches the data is generated from relational database schema information (page 2, section 0021-0026).

With respect to claim 3, Shanmugasundaram teaches the schema information is in the form of metadata (page 2, section 0021-0026).

With respect to claim 4, Shanmugasundaram teaches the declarative description component derives logical and physical information from the relational database (page 2, section 0021-0026).

With respect to claim 5, Shanmugasundaram teaches the physical information is harvested directly from schema information of the relational database (page 2, section 0021-0026).

With respect to claim 6, Shanmugasundaram teaches the logical information is generated with annotation information associated with the relational database (page 2, section 0021-0026).

With respect to claim 7, Shanmugasundaram teaches the annotation information is obtained at least one of manually by a user and automatically by the system, or by a combination (page 2, section 0021-0026).

With respect to claim 8, Shanmugasundaram teaches the logical information describes a relationship between at least two tables of the relational database (page 2, section 0021-0026).

With respect to claim 9, Shanmugasundaram teaches the declarative description component is based upon an XML syntax (page 2, section 0021-0026).

With respect to claim 10, Shanmugasundaram teaches the data is segmented into smaller data portions (fig. 3, page sections 0030-0035).

With respect to claim 11, Shanmugasundaram teaches the data is segmented to allow logical extensions thereof (fig. 3, page sections 0030-0035).

With respect to claim 12, Shanmugasundaram teaches the data is a logical view of metadata of the relational database (fig. 3, page sections 0030-0035).

With respect to claim 13, Shanmugasundaram teaches the description component generates the data with sufficient metadata to allow generation and/or execution of create, read, update, and delete operations against the relational database (page sections 0030-0035).

With respect to claim 14, Shanmugasundaram teaches the declarative description component derives physical information from the relational database to generate the data, which physical information is regenerated each time the description component executes against the database (fig.1, page 2, section 0029-0031).

With respect to claim 15, Shanmugasundaram teaches the data is updated by executing the declarative description component against the database to overwrite the data (fig.1, page 2, section 0029-0031).

With respect to claim 16, Shanmugasundaram teaches the updated data preserves user-supplied extensions (fig.1, page 2, section 0029-0031).

With respect to claim 17, Shanmugasundaram teaches an application using the data initiates an update process of the data (fig.1, page 2, section 0029-0031).

With respect to claim 18, Shanmugasundaram teaches a classification component that performs an automated function, the classification component employs at least one of a probabilistic-based analysis or statistical-based analysis, or a combination, to infer that an automated function be automatically performed (page 3, sections 0031-0038).

With respect to claim 19, Shanmugasundaram teaches the automated function automatically determines at least one of when the data will be updated and what location will be updated, or a combination (page 3, sections 0031-0038).

With respect to claim 20, Shanmugasundaram teaches the classification component is a support vector machine (page 3, sections 0031-0038).

With respect to claim 21, Shanmugasundaram teaches the automated function includes automatically annotating physical information representative of the relational

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database to generate logical information associated with the relational database (page 3, sections 0031-0038).

With respect to claim 22, Shanmugasundaram teaches returning a degree of certainty that annotation of the physical information is correct (page 3, sections 0031-0038).

With respect to claim 23, Shanmugasundaram teaches computer operating (page 1, sections 0003-0007, page 2, section 0029-0031).

With respect to claim 25, Shanmugasundaram teaches the declarative description component derives logical and physical information from the metadata, which physical information is derived directly from the metadata, and which logical information includes annotations of the physical information (page 2, section 0029-0031).

With respect to claim 26, Shanmugasundaram teaches the annotation information is added incrementally (page 2, section 0029-0031).

With respect to claim 27, Shanmugasundaram teaches the data file is segmented into smaller data tiles to allow logical extensions thereof (page 2, section 0029-0031).



With respect to claim 28, Shanmugasundaram teaches the data file is stored local to the database (page 2, section 0029-0031).

With respect to claim 29, Shanmugasundaram teaches the declarative description component runs against the relational database from a location remote from the relational database (page 2, section 0029-0031).

With respect to claim 30, Shanmugasundaram teaches the relational database is distributed across at least two network locations such that the description component runs against each location database to generate respective data files (page 2, section 0021-0026).

With respect to claim 31, Shanmugasundaram teaches the respective data files are retrieved and processed to regenerate the relational database (page 2, section 0021-0026).

With respect to claim 32, Shanmugasundaram teaches the data files are retrieved and processed by corresponding applications in a disconnected environment (page 2, section 0021-0026).

With respect to claim 33, Shanmugasundaram teaches the format is one of implementation-neutral or implementation-specific (page 3, sections 0031-0038).

***Conclusion***

5. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Isaac M. Woo whose telephone number is (571) 272-4043. The examiner can normally be reached on 8:00-5:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Hosain T. Alam can be reached on (571) 272-3978. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.



Isaac Woo  
May 24, 2007